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| APPLICATION NO.   | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|---------------------|------------------|
| 10/822,869  | 04/13/2004  | Ken Katayama         | 042339              | 2657             |
| 38834   | 7590        | 05/04/2006           | EXAMINER            |                  |
| WESTERMAN, HATTORI, DANIELS & ADRIAN, LLP<br>1250 CONNECTICUT AVENUE, NW<br>SUITE 700<br>WASHINGTON, DC 20036 |             |                      | ROY, ANURADHA       |                  |
|   |             |                      | ART UNIT            | PAPER NUMBER     |
|   |             |                      | 3736                |                  |

DATE MAILED: 05/04/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

|                              |                                      |  |  |
|------------------------------|--------------------------------------|--|--|
| <b>Office Action Summary</b> | <b>Application No.</b><br>10/822,869 | <b>Applicant(s)</b><br>KATAYAMA ET AL. |  |
|                              | <b>Examiner</b><br>Anuradha Roy      | <b>Art Unit</b><br>3736                |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 27 March 2004.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-18 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>7/27/04</u> . | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Claim Rejections - 35 USC § 112***

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claim 7 is rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter, which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention. It is not clear to the Examiner how the inclination measurement reference points are operative to blink, additionally, it is not clear to the Examiner the use of inclination measurement reference points with both bright points and the dark points. For these reasons, art cannot be applied to Claim 7 at this time. The Applicant is required to provide a further description in the specification or to alter the claim language without introducing new matter.

### ***Claim Rejections - 35 USC § 103***

[01] The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject

matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1, 2, 8, 9, 10, 11-14, 17, & 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Arme, Jr. (US Patent No. 5,080,109) in view of Blumentritt et al. (US Patent No. 5,609,162).

Regarding claims 1 & 18, Arme, Jr. discloses a posture diagnosis equipment capable of diagnosing a posture of an examinee for use in combination with a photographing device for photographing the posture of the examinee and a foot pressure measuring device for measuring a foot pressure of the examinee, the posture diagnosis equipment comprising:

photograph data receiving means (11) to receive photograph data obtained by photographing of the posture of the examinee from plural predetermined directions with the photographing device;

photograph data display means (12) to display the photograph data received by the photograph data receiving means;

posture diagnosis point coordinates receiving means (12, Figure 2 & Column 4, lines 19-22 & Column 5, lines 16-25) receive the coordinates of a posture diagnosis point serving as an indicator for diagnosis of the posture of the

examinee, the posture diagnosis point being specified relative to the photograph data displayed by the photograph data display means;

and figure judgment means (30 & Column 4, lines 41-64) to diagnose and typify the posture of the examinee based on the gravitational center line calculated by the gravitational center line calculating means and the coordinates of the posture diagnosis point received by the posture diagnosis point coordinates receiving means.

Arme, Jr. further discloses a posture diagnostic equipment having "a weight scale on the subject platform for transmitting data to the computer regarding the weight distribution on the feet of the subject" (Abstract & Column 5, lines 3-6). However, Arme, Jr. does not directly disclose a foot *pressure* data receiving means to receive foot pressure data obtained by measurement of the foot pressure of the examinee with the foot pressure measuring device or a gravitational center line calculating means to calculate a gravitational center line of the examinee which passes vertically through a gravitational center of the examinee based on the foot pressure data received by the foot pressure data receiving means. Blumentritt et al., however, does disclose a system having a foot *pressure* data receiving means (Column 2, line 63 – Column 3, line 5) to receive foot pressure data obtained by measurement of the foot pressure of the examinee with the foot pressure measuring device or a gravitational center line calculating means (Column 1, lines 47-54 & Figure 1) to calculate a gravitational center line of the examinee which passes vertically through a gravitational center of the examinee based on the foot pressure data received by the foot pressure data receiving

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means. It would have been obvious to one having ordinary skill in the art at the time the invention in view of Blumentritt et al. to incorporate a foot pressure data receiving means and a gravitational center line calculating means with Arme et al. since "the center of gravity line of the human body as it relates to the joint positions plays an important role in the measurements of the body" (Column 1, lines 24-26).

In regards to claim 2, Arme, Jr. discloses a posture diagnosis equipment, wherein the photograph data receiving means is operative to receive plural photograph data items related to a single photographing direction, the posture diagnosis equipment further comprising averaging means (Column 4, lines 55-68 & Column 5, lines 18-20) to sum up and then average the plural photograph data items related to the single photographing direction received by the photograph data receiving means to obtain a single photograph data item related to the single direction, the photograph data display means (34) being operative to display the photograph data having undergone the averaging process by the averaging means.

With regard to claim 8, Blumentritt et al. discloses a posture diagnosis equipment, further comprising gravitational center line display means (Figure 1) to display the gravitational center line calculated by the gravitational center line calculating means in a manner to superimpose the gravitational center line on the photograph data displayed by the photograph data display means.

In regards to claim 9, Blumentritt et al. discloses a posture diagnosis equipment, further comprising reference position determining means (Figure 1, X) to determine a

reference position based on a position which is applied with pressure sensed by the foot pressure measuring device when a reference member for use in determining the reference position is placed on the foot pressure measuring device.

Regarding claim 10, Blummentritt et al. discloses a posture diagnosis equipment, further comprising horizontal distance calculating means (Figure 1, X & Column 3, lines 27-47) to calculate a horizontal distance between the gravitational center line and a vertical center line passing through the reference position determined by the reference position determining means.

With regard to claim 11, Arme, Jr. discloses a posture diagnosis equipment, wherein the photograph data display means is capable of enlarged display (Figure 2, 30) of a region in the photograph data corresponding to a region around the posture diagnosis point when the posture diagnosis point coordinates receiving means receives the coordinates of the posture diagnosis point.

With regard to claim 12, Arme, Jr. discloses a posture diagnosis equipment, wherein the photograph data display means is capable of displaying information indicative of the name and approximate location of the posture diagnosis point when the posture diagnosis point coordinates receiving means receives the coordinates of the posture diagnosis point (Column 5, lines 7-11).

In regards to claim 13, Arme, Jr. discloses a posture diagnosis equipment, wherein the figure judgment means is capable of visually outputting the posture of the examinee typified with use of a two-dimensional (3) or three-dimensional model.

With regard to claim 14, Arme, Jr. discloses a posture diagnosis equipment, wherein the figure judgment means is operative to categorize posture diagnosis points as to whether or not the posture diagnosis points are in preferable positions based on positional relation between correlated ones of the posture diagnosis points and then visualize the posture of the examinee in a manner to express resulting categories clearly (30 & Column 2, lines 62-68).

Regarding claim 17, Arme, Jr. discloses a posture diagnosis equipment, further comprising advice information output means (Column 5, lines 26-30) to output information serving as advice about the posture of the examinee based on the posture of the examinee typified by the figure judgment means.

#### **Additional Claim Rejections - 35 USC § 103**

Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over Arme, Jr. in view of Blumentritt et al. and further in view of Au (US Patent No. 4,813,436).

Regarding claim 3, Arme, Jr. in view of Blumentritt et al. discloses a posture diagnosis equipment with the aforementioned elements. However, Arme, Jr. in view of Blumentritt et al. does not disclose a posture diagnosis equipment comprising sharpening means to sharpen the photograph data, wherein the photograph data display means is operative to display the photograph data having undergone the sharpening process by the sharpening means. Au, however, discloses a sharpening means (Figure 10, Column 6, lines 9-15) to sharpen the photograph data, wherein the photograph data display means is operative to display the photograph data having



undergone the sharpening process by the sharpening means. It would have been obvious to one having ordinary skill in the art at the time the invention in view of Au to incorporate a sharpening means with Arme, Jr. in view of Blumentritt et al. in order to enhance the image quality.

### **Additional Claim Rejections - 35 USC § 103**

Claims 4-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Arme, Jr. in view of Blumentritt et al. and further in view of Berthonnaud et al. (US Publication No. 2003/0004438).

Regarding claim 4, Arme, Jr. in view of Blumentritt et al. discloses a posture diagnosis equipment with the aforementioned elements. However, Arme, Jr. in view of Blumentritt et al. does not disclose a system comprising inclination error correction means. However, Berthonnaud et al. does disclose an inclination error correction means (21 & [0067]-[0069]) to correct the photograph data to reduce an inclination error which is a degree of inclination of an upper edge of the foot pressure measuring device appearing in the photograph data relative to a horizontal axis of the photograph data, wherein the photograph data display means is capable of displaying (23) the photograph data having undergone the correction process by the inclination error correction means. It would have been obvious to one having ordinary skill in the art at the time the invention in view of Berthonnaud et al. to incorporate an inclination error correction means with Arme, Jr. in view of Blumentritt et al. in order to "improve the accuracy of the calculation"[0067].

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Regarding claim 5, Arme, Jr. in view of Blumentritt et al. and further in view of Berthonnaud et al. discloses a posture diagnosis equipment, wherein: the foot pressure measuring device has inclination measurement reference points (along Xb, Ob, Yb axes & [0067]) as a reference for measurement of the inclination error at predetermined locations thereon; the photograph data to be received by the photograph data receiving means contains inclination measurement reference point data on the inclination measurement reference points photographed [0067]; and the inclination error correction means is operative to measure the inclination error based on the inclination measurement reference point data contained in the photograph data and then reduce the inclination error [0067].

In regards to claim to claim 6, Arme, Jr. in view of Blumentritt et al. and further in view of Berthonnaud et al. discloses a posture diagnosis equipment, wherein: the foot pressure measuring device has plural inclination measurement reference points (along Xb, Ob, & Yb axes) located on a horizontal straight line on a surface thereof facing the photographing device; the photograph data to be received by the photograph data receiving means (23) contains inclination measurement reference point data on the plural inclination measurement reference points photographed; and the inclination error correction means is operative to reduce the inclination error, regarding as the inclination error a degree of inclination of a straight line linking the plural inclination measurement reference points appearing in the photograph data relative to the horizontal axis of the photograph data[0067].

**Additional Claim Rejections - 35 USC § 103**

Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Arme, Jr. in view of Blumentritt et al. and further in view of Guimond et al. (US Publication No. 2003/0181830).

Regarding claim 15, Arme, Jr. in view of Blumentritt et al. discloses a posture diagnosis equipment with the aforementioned elements. However, Arme, Jr. in view of Blumentritt et al. does not disclose a figure judgment means operative to visualize the posture of the examinee in a manner to express a stretched or contracted condition of body tissue intervening between correlated ones of the posture judgment points. Guimond et al. (US Publication No. 2003/0181830) discloses a figure judgment device (Figures 6 & 7) operative to visualize the posture of the examinee in a manner to express a stretched or contracted condition of body tissue intervening between correlated ones of the posture judgment points ([0025]-[0037]). It would have been obvious to one having ordinary skill in the art at the time the invention was visualized the posture of the examinee with Arme, Jr. in view of Blumentritt et al. in order "to analyze these body segment positions to obtain body segment biomechanical parameters and deviations" [0007].

**Additional Claim Rejections - 35 USC § 103**

Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over Arme, Jr. in view of Blumentritt et al. and further in view of Sol (US Patent No. 6,231,527).

In regards to claim 16, Arme, Jr. in view of Blumentritt et al. discloses a posture diagnosis equipment with the all of the aforementioned elements, as well as a foot pressure typifying means to typify the foot pressure data received by the foot pressure data receiving means. However, Arme, Jr. in view of Blumentritt et al. does not directly disclose a posture diagnosis equipment comprising a foot pressure pattern display means (Figure 1A & Figures 4-5A) to display a pattern of foot pressure typified by the foot pressure typifying means. It would have been obvious to one having ordinary skill in the art at the time the invention in view of Sol to incorporate a foot pressure pattern display means with Arme, Jr. in view of Blumentritt et al. in order to provide "...analysis which can be coordinated with the measurement of ground reactive and weight-bearing forces on the feet to prescribe orthotics with will biomechanically correct any abnormalities in gait and posture" (Column 2, lines 50-58).

### **Conclusion**

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Anuradha Roy whose telephone number is (571) 272-6169 and whose email address is anuradha.roy@uspto.gov. The examiner can normally be reached between 8:00am and 4:00pm.


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Max Hindenburg can be reached on 571-272-4726.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status

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information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

~AR~

  
MAX H. HINDERBURG  
PATENT EXAMINER  
EBC/CENT 3736